

### **REMARKS**

Claims 1-71 remain in this application. Further reconsideration is requested.

#### **Restriction requirement**

Further reconsideration and withdrawal of the restriction requirement withdrawing claims 30 – 57 from examination on the merits is requested. Claims 1 – 29 and claims 58 – 71 have been grouped together as process and apparatus for carrying out the process, respectively. Claims 30 – 57 are directed to the product made by the claimed process as carried out by the claimed apparatus. 37 CFR 1.475(b) provides that “a national stage application containing claims to different categories of invention will be considered to have unity of invention if the claims are drawn only to one of the following combinations of categories: . . . (5) A product, a process specially adapted for the manufacture of the said product, and an apparatus or means specifically designed for carrying out the said process.” Here, claims 1-29 and claims 30-71 are related as a process and apparatus for carrying out the process respectively, and claims 30 – 57 are directed to the product. Hence, under the applicable rule, 37 CFR 1.475(b)(5), the present application must be considered to have unity of invention. Withdrawal of the restriction requirement is thus indicated based on Rule 475(b). Accordingly, the Examiner is requested to rejoin claims 30 – 57 with the remaining claims and to examine claims 30 – 57 on the merits.

#### **35 U.S.C. § 102 Rejections**

The rejection of claims 1, 4, 16, 17, 58, 61 – 65 and 70 as being anticipated by Skelly et al., U.S. Patent No. 5,419,971, and the rejection of claims 1, 4, 58, 64, 65, 69 and 70 as being anticipated by Bruce et al., U.S. Patent No. 5,683,825, are respectfully traversed to the extent that these grounds of rejection may be applied to independent claims 1 and 58 as amended.

Specifically, claims 1 and 58 have been amended to eliminate zirconia and zirconia alloy as a possible thermal-insulating layer. Each of Skelly et al. and Bruce et al. disclose only zirconia or zirconia stabilized with yttria as a thermal-insulating layer. Accordingly, these grounds of rejection are not applicable to the claims as amended, and should be withdrawn.

**35 U.S.C. § 103 Rejections**

The rejection of claims 2, 3, 5 – 15, 18 – 29, 59, 60, 66 – 69 and 71 as being unpatentable over Skelly et al. in view of Wadley et al, U.S. Patent No. 5,534,314, and the rejection of claims 2, 3, 5 – 29, 59 – 61, 66 – 68 and 71 as being unpatentable over Bruce et al. in view of Wadley et al., U.S. Patent No. 5,736,073, also are respectfully traversed to the extent that these grounds of rejection may be applied to the claims as amended herein.

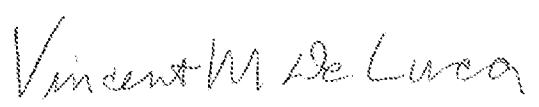
First, neither Skelly et al. nor Bruce et al. disclose the limitations of the independent claims, and thus no combination of Wadley 314 or Wadley 073 with either of the primary references could result in the claimed invention.

Second, the proposed combination of prior art fails to disclose the particular features of the dependent claims. In particular, neither of the proposed combinations discloses the use of refractory metals as set forth in claims 2 and 59, carbide material as set forth in claims 3 and 60, the specifics of the DVD technique set forth in claims 6 – 15, providing gaps between columnar grains as set forth in claims 16 and 62 - 65 (note the “gaps” in Skelly are not between the columnar layers 44); the screen of claim 19, first and second evaporant sources as set forth in claim 22, the insoluble material as set forth in claim 23, the sacrificial template as set forth in claims 26 – 28, or the structures as set forth in claims 66 – 68. Moreover, the Office action has failed to address any of these specific limitations or to explain where such limitations are found in the prior art references relied on. Thus, a *prima facie* showing of obviousness has not be made on the record, and consequently these grounds of rejection cannot be sustained.

**Conclusion**

In view of the foregoing, favorable reconsideration of claims 1-71 is requested.

Please charge any fee or credit any overpayment pursuant to 37 CFR 1.16 or 1.17 to Novak Druce Deposit Account No. 14-1437.

RESPECTFULLY SUBMITTED,					
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